

# Airline Market Outlook

*Some Key Elements Shaping the New Industry*

*(30 to 120 seat segment)*



**João Alfredo Paiva**  
*Sr. Manager Market Strategy*

 **EMBRAER**  
*Commercial Jets*

- ✈ **Key Global Market Trends**
- ✈ **Regional Jets Sustained Operation**
- ✈ **From Concept to Reality – the *E*-Jets Family**
- ✈ **EMBRAER Market Forecast**

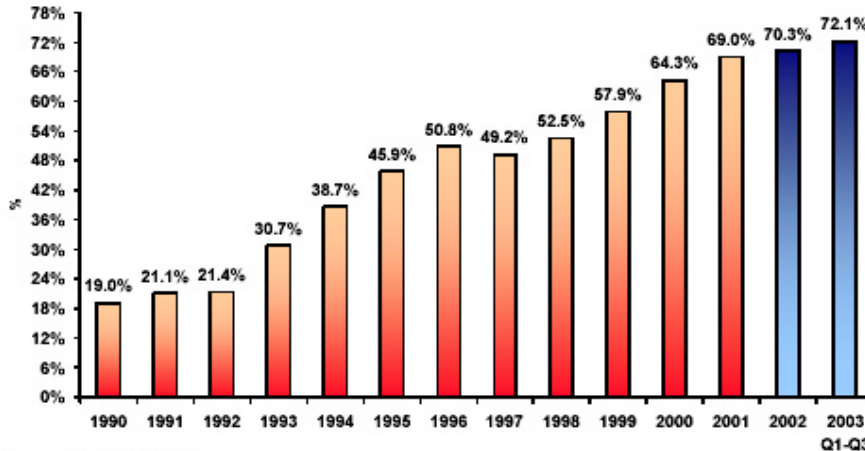
# Forward Looking Statement

*This presentation includes forward-looking statements or statements about events or circumstances which have not occurred. We have based these forward-looking statements largely on our current expectations and projections about future events and financial trends affecting our business and our future financial performance. These forward-looking statements are subject to risks, uncertainties and assumptions, including, among other things: general economic, political and business conditions, both in Brazil and in our market.*

*The words “believes,” “may,” “will,” “estimates,” “continues,” “anticipates,” “intends,” “expects” and similar words are intended to identify forward-looking statements. We undertake no obligations to update publicly or revise any forward-looking statements because of new information, future events or other factors. In light of these risks and uncertainties, the forward-looking events and circumstances discussed in this presentation might not occur. Our actual results could differ substantially from those anticipated in our forward-looking statements.*

# Key Global Market Trends

## LCC Expansion



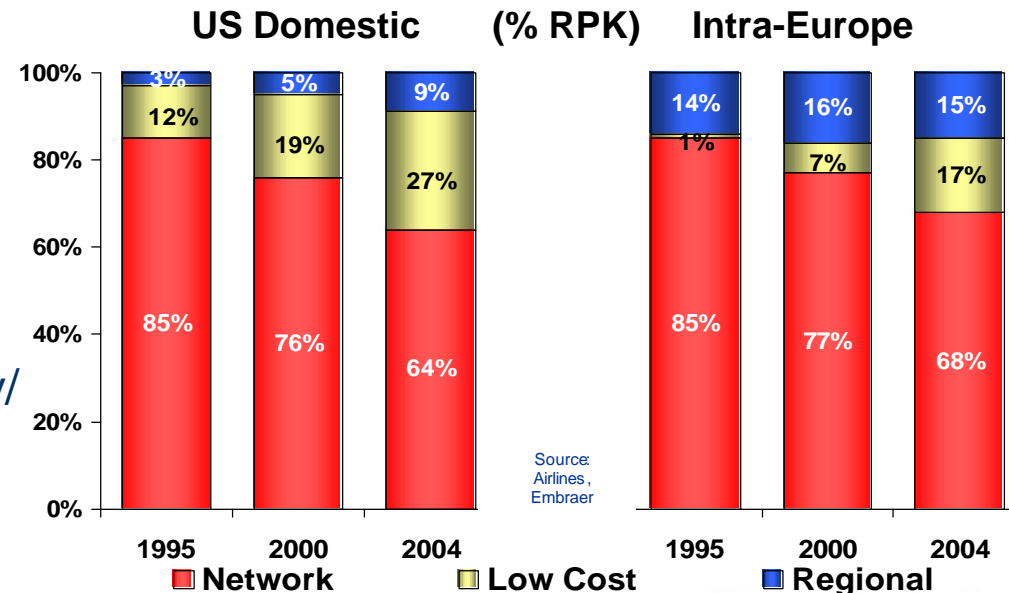
Sources: US DOT DB1A Database.

Notes: 2003 data are from the first three quarters. Low cost carrier presence is defined as at least 5% share of O&D passengers.

- Around 70% of all domestic passengers in North America and Europe have access to low cost carriers services.
- LCCs hold air fare pricing power.
- Passengers are more stringent on air travel value proposition.

## Shift in Market Share

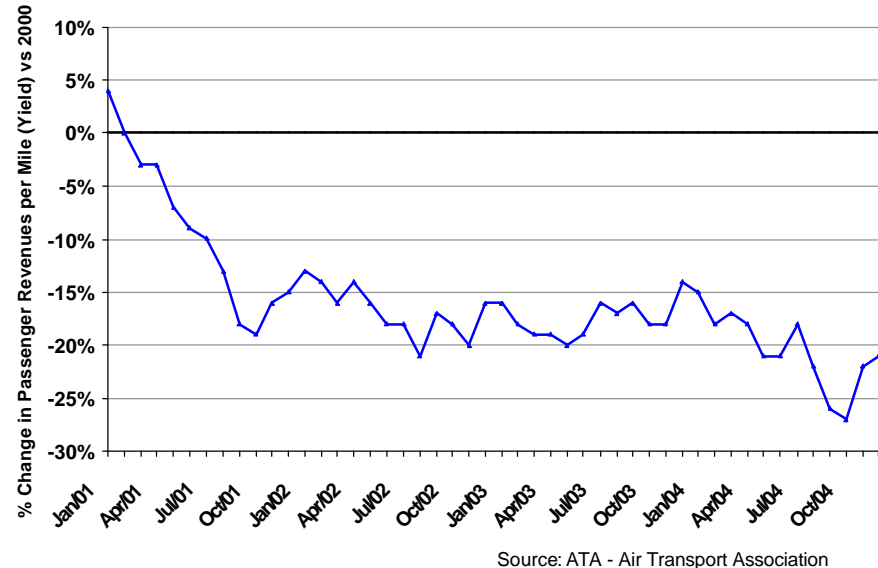
- US: LCCs and Regionals expanding.
- Intra-Europe: LCCs expanding and Regionals concentrating on secondary/business markets development.



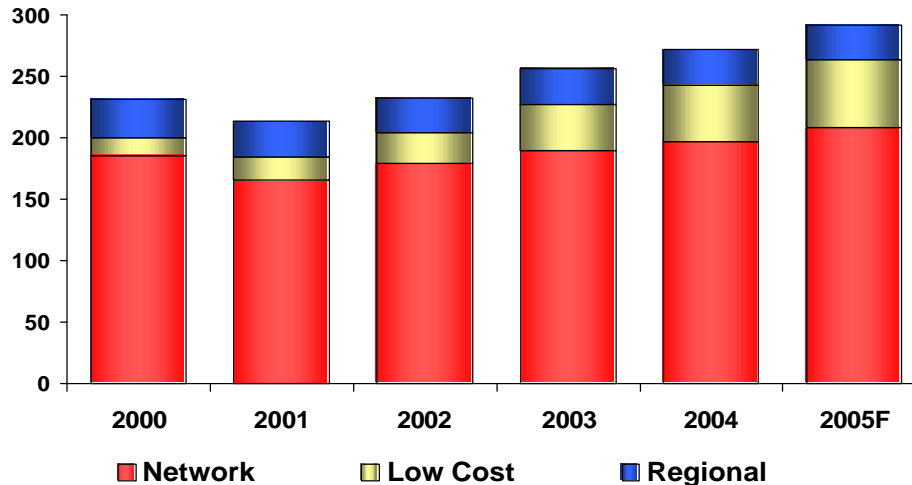


# Key Global Market Trends

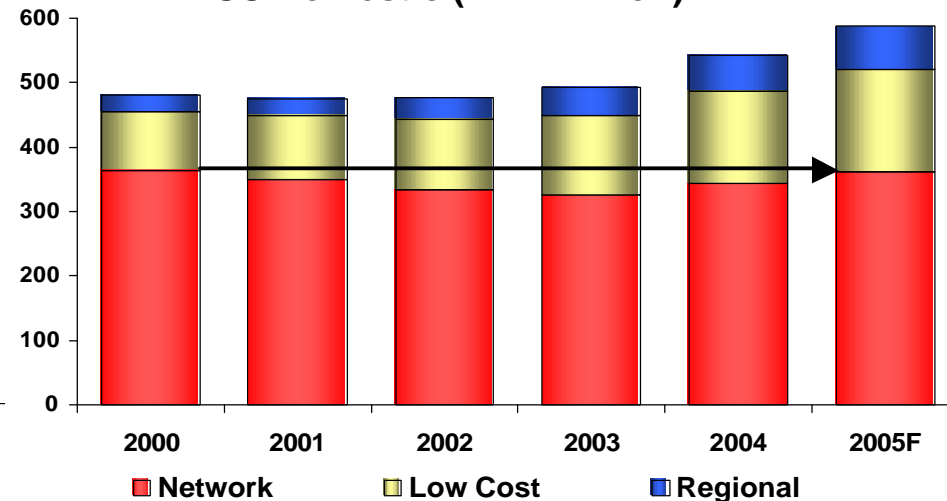
- **U.S. Pax Yields Down Sharply from 2000**
  - No evidences or expectation of a sizable recuperation.
- **Traffic Recovering**



**Intra-Europe (RPK Billion)**



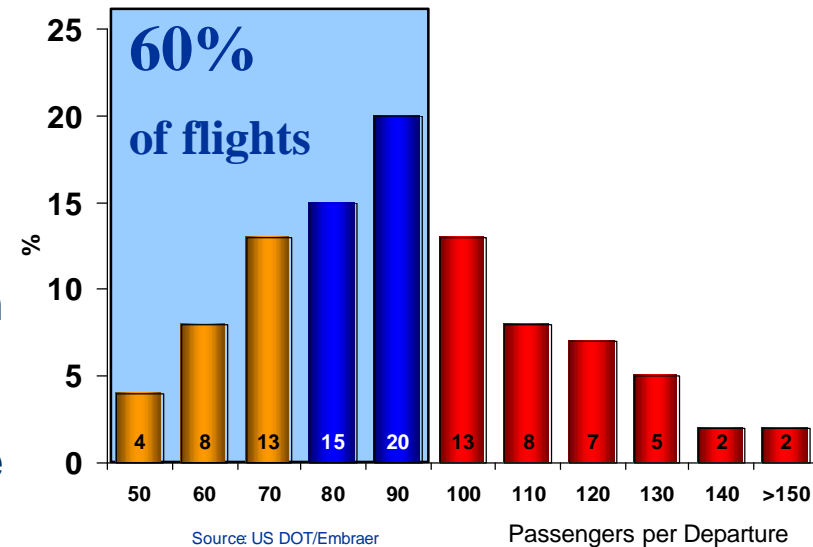
**US Domestic (RPM Billion)**



# Key Global Market Trends

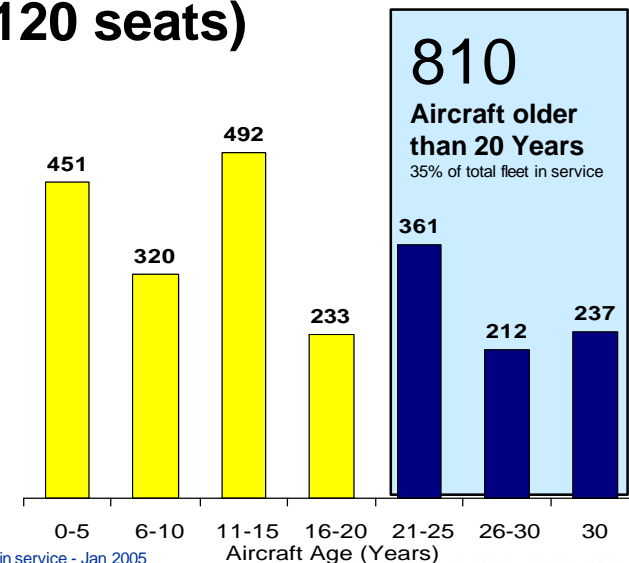
- **Fleet Right-Sizing**

- 60% of all US domestic flights depart with load factor more appropriate to 70-110 seat aircraft.
- 95% of all narrow-body flights are within 1,700nm range.
- 85% of all city pairs around the world are served with less than two frequencies a day.



- **Replacement Crisis – Ageing Fleets (61 to 120 seats)**

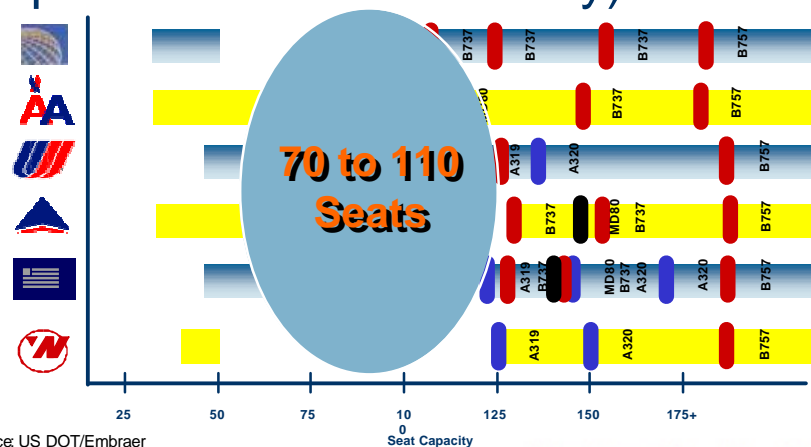
- 35% of total fleet is more than 20 years in service and shall start to be replaced in the coming years.
- Old technology equipments, most of them no longer in production.
- Inefficient and expensive aircraft to operate.



# Not Another Cycle, but a Fundamental Change



- ✈ New Passenger Profile → Different Value Proposition
- ✈ Ultra Competitive Environment
- ✈ Fierce Competition among 3 models (LCC x Network x Regionals)
  - It's all about cost and efficiency
- ✈ Strong Focus on Cost Reduction, Reduced Investments
  - Cash is King
- ✈ Maximum Utilization of Assets (fleet optimization and flexibility)
- ✈ Fast Scope Clauses Relaxation /  
/ Closing the 70-110 Seat Gap  
(Bottom-Up and Top-Down)



Source: US DOT/Embraer



# Regional Jets Sustained Operation



## When markets are strong...

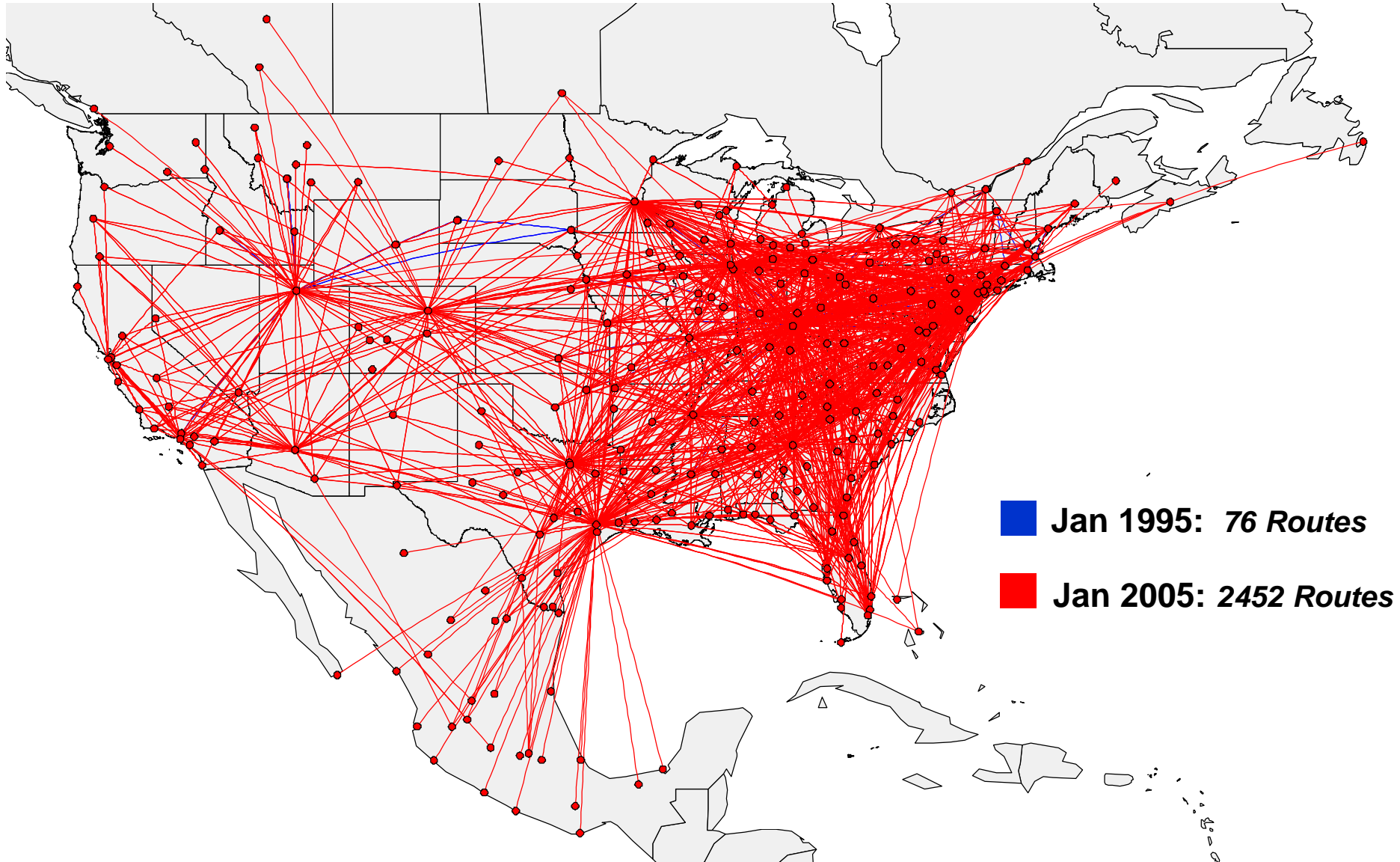
RJs expand the air transport system by enhancing catchment areas, adding more spokes to carrier hubs, opening new routes and increasing frequency.

## ... and when markets are weak

RJs help to defend an airline's overall market presence / network integrity by maintaining route-frequency, replacing unprofitable mainline jet services and rightsizing aircraft capacity to demand.



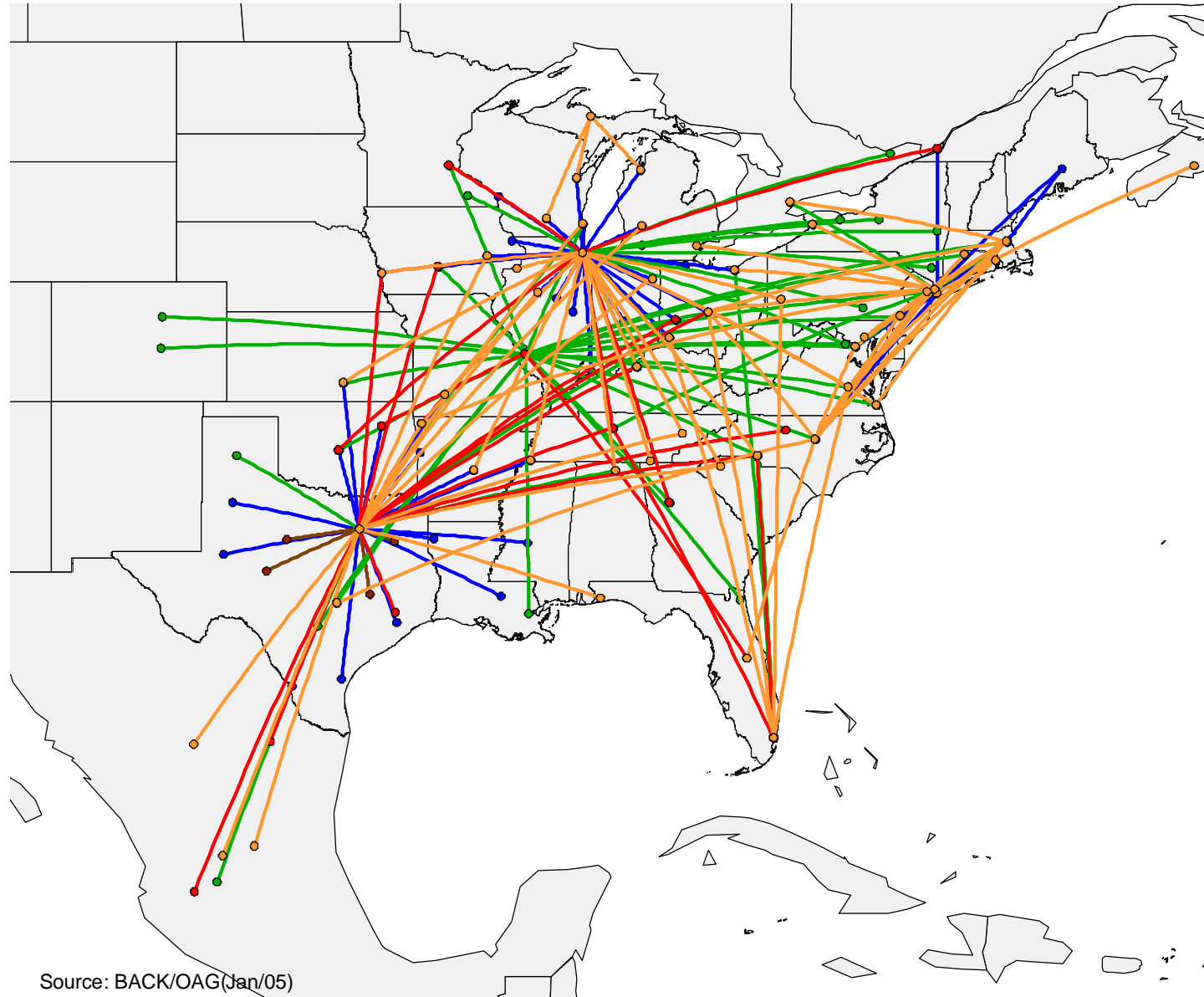
# Regional Jets Network - USA



Source: Back/OAG (Feb/05 - ERJ-145/140/135, CRJ-100/200/440, 328Jet routes)

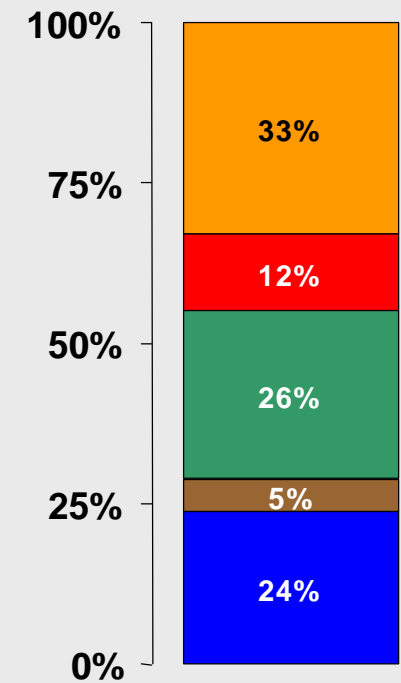


# ERJ - American

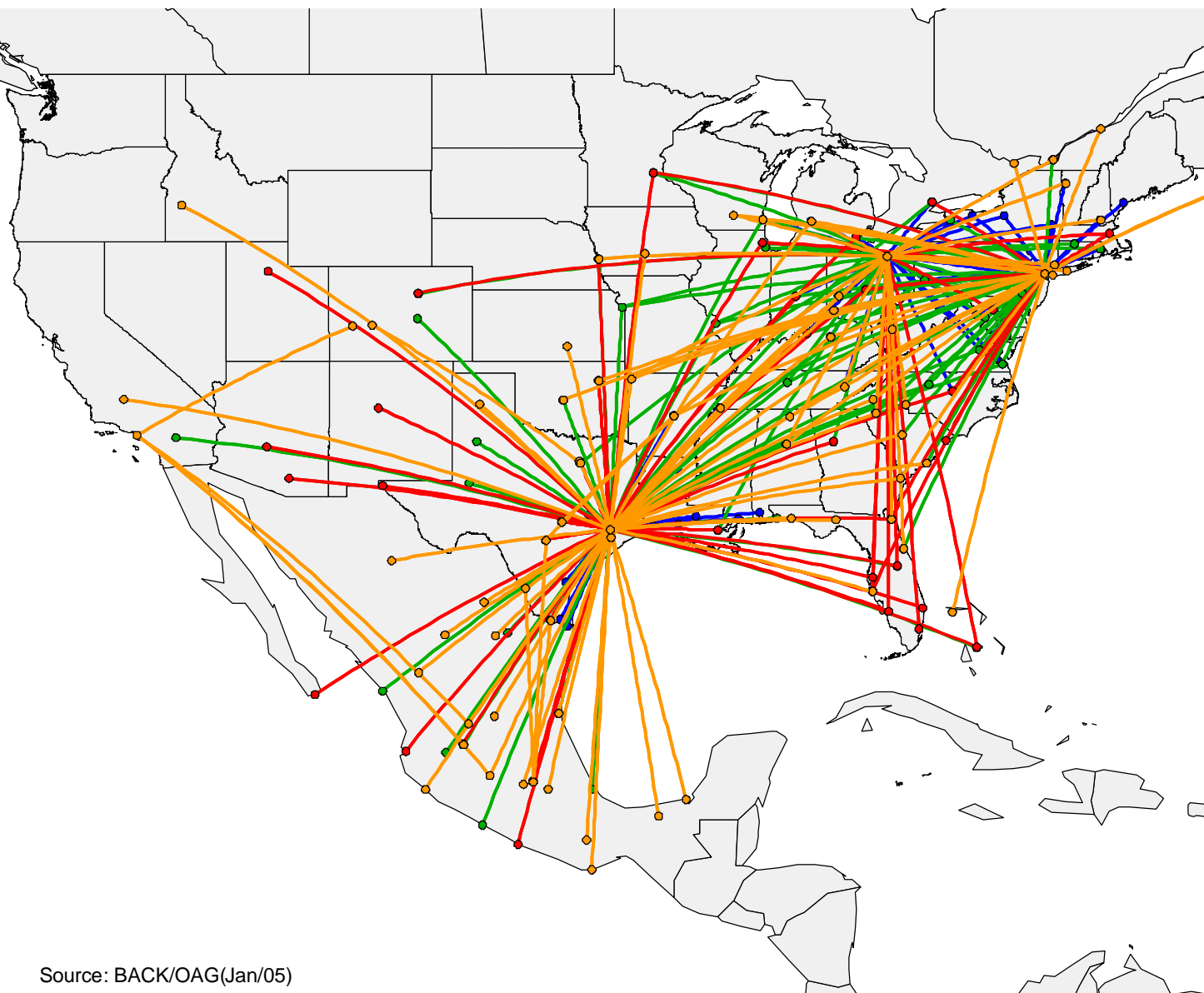


Source: BACK/OAG (Jan/05)

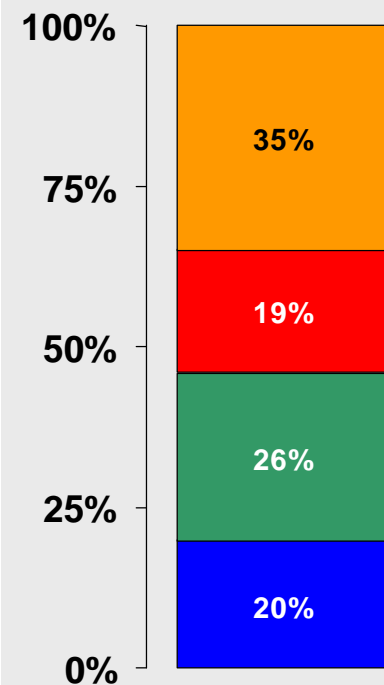
**New Route**  
**Jet Complement**  
**Jet Replacement**  
**TP Complement**  
**TP Replacement**



# ERJ - Continental



**New Route**  
**Jet Complement**  
**Jet Replacement**  
**TP Replacement**

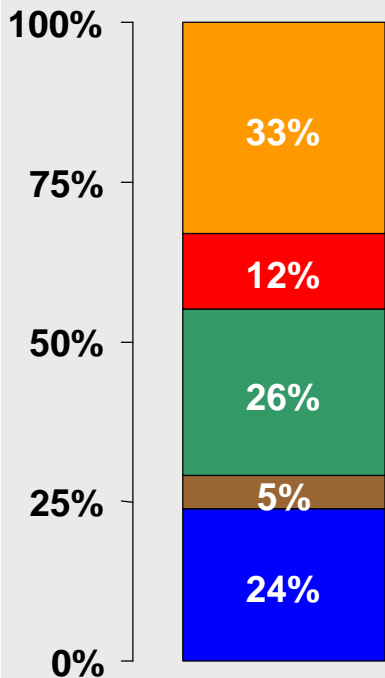


Source: BACK/OAG(Jan/05)

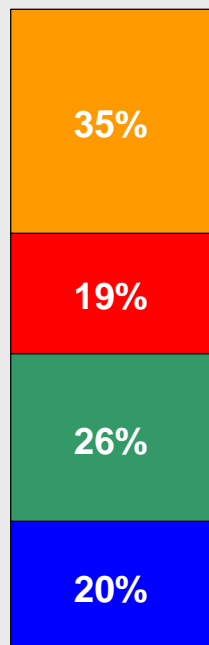
# ERJ 145 Family Main Missions

## TP Replacement

### Jet Complement

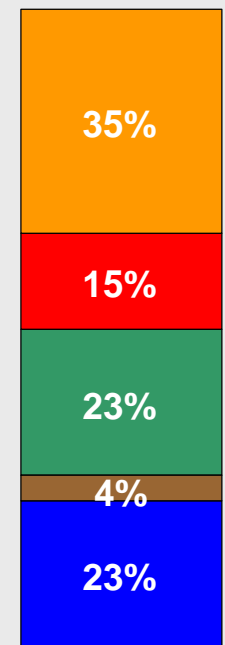
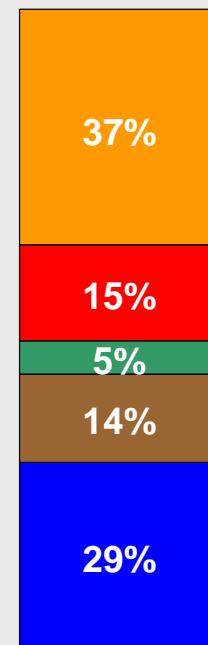
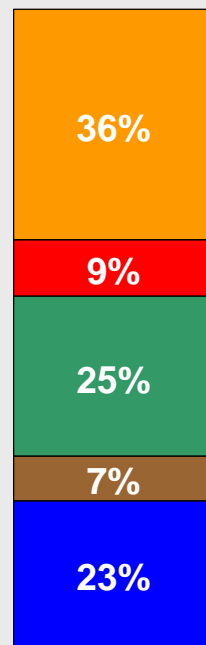


## TP Complement



## Jet Replacement

### New Route



# ERJ 145 Family

## The Evolution of Regionals



**An Intrinsic Part of the Solution**

# ERJ 145 Family Orderbook



(as of December 31<sup>st</sup>, 2004)



	Firm	Options	Total	Deliveries	Firm Backlog
ERJ 135	123	2	125	106	17
ERJ 140	94	20	114	74	20
ERJ 145	684	314	998	618	66
Total	901	336	1,237	798	103



# From Concept to Reality – **E**-establishing the 170/190 Family



## **THE FIRST ISSUE: THE NEED FOR AIRLINES TO RIGHT-SIZE THEIR FLEETS**

The Rule gives the airlines the tools to right-size their fleets thereby optimally matching capacity to demand.

## **THE SECOND ISSUE: AIRLINES USING AIRCRAFT WITH TOO MUCH CAPACITY**

The Rule, by allowing the airline to efficiently right-size, creates increased frequency to capture market share and provides customers with more choice. The airlines can therefore focus their 120-plus seat aircraft on high-demand routes.

## **THE THIRD ISSUE: USE OF TODAY'S REGIONAL JETS IS NOT OPTIMIZED**

The Rule provides the right aircraft for the right market and allows the airlines to reposition their existing fleets to ensure that aircraft are neither overused or underused.

## **THE FOURTH ISSUE: AGEING FLEETS**

The Rule, by introducing the right equipment for the right market, gives airlines the opportunity to develop the most optimum aircraft replacement strategy.

# The **E-** Jets Family



**Certification  
Mid 2006**



**Certification  
Mid 2005**



**Certified  
CTA / EASA  
TC Mid 2005**



**Certified  
CTA / FAA / EASA**

# EMBRAER 170 EIS Statistics

## Operating Summary

<b>Operators</b>	<b>5</b>
<b>Aircraft in Service</b>	<b>53</b>
<b>Flight hours</b>	<b>61,740</b>
<b>Flight Cycles</b>	<b>43,570</b>

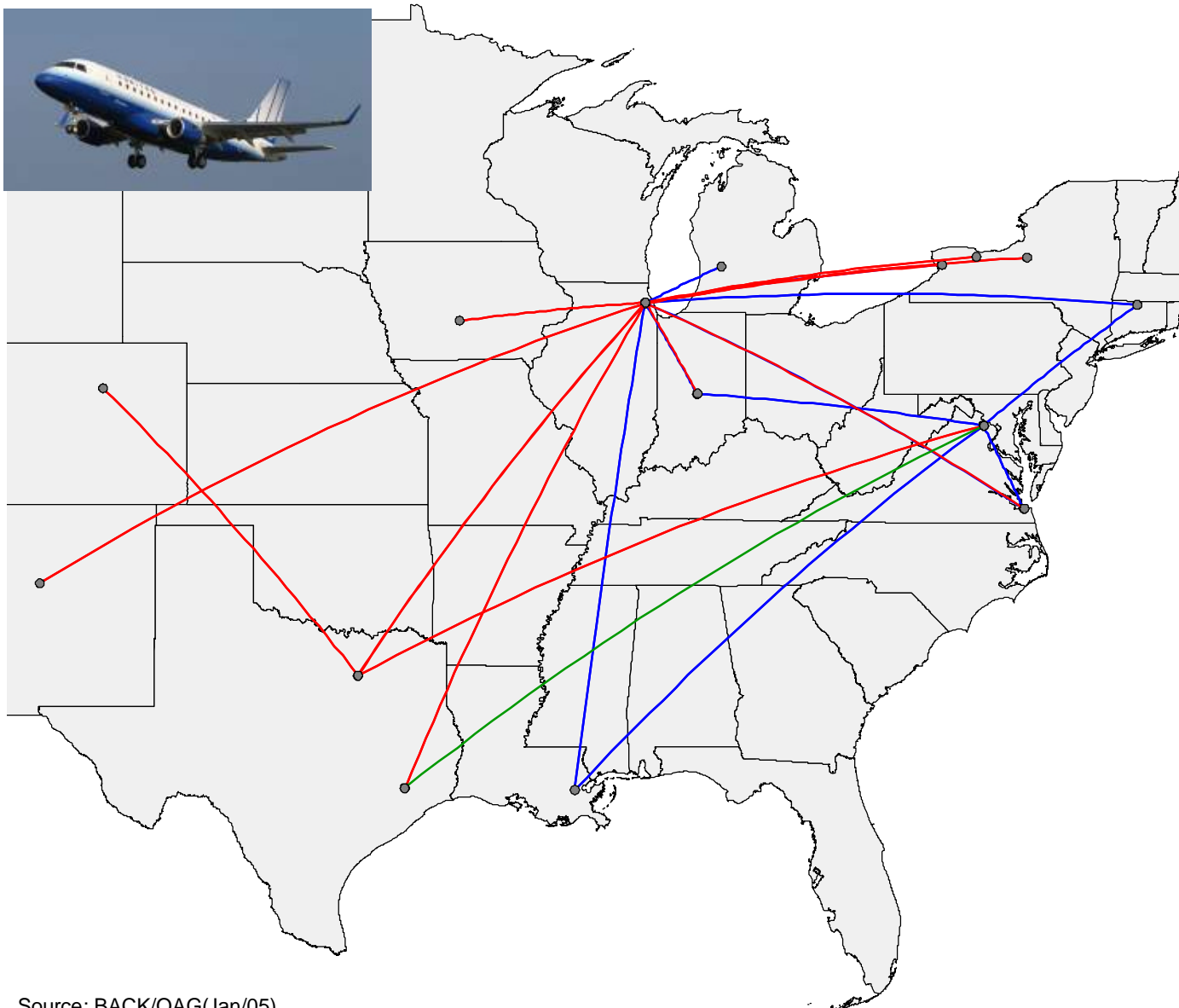
(as of February 16<sup>th</sup>, 2005)



# EMBRAER 170 Network

**UNITED**  
EXPRESS

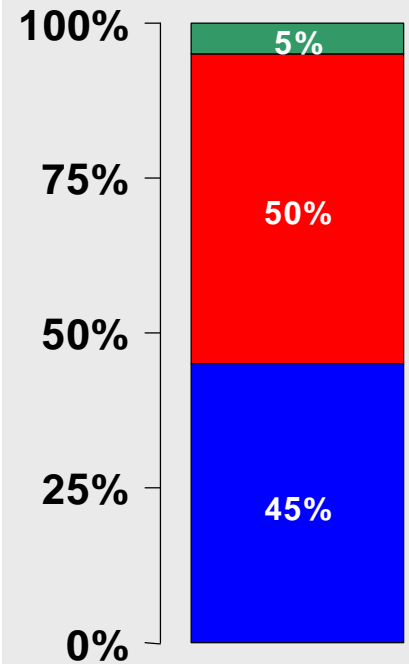
**EMBRAER**  
Commercial Jets



**New Route**

**Right-sizing**

**Natural Growth**



Source: BACK/OAG(Jan/05)

# EMBRAER 170 - Republic

UNITED  
EXPRESS

EMBRAER  
Commercial Jets

*"The 170's unique design allows us to offer United a true mainline product but at regional jet operating economics".*

Bryan Bedford, Chairman, President and CEO  
of Republic Airways Holdings (Sep/2004)

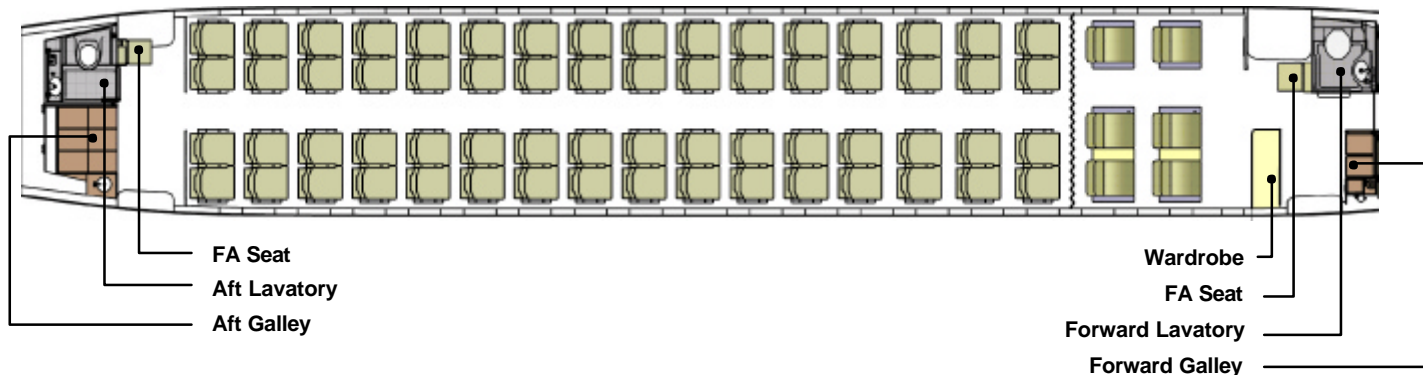


70 seats:

48 @ 31" pitch

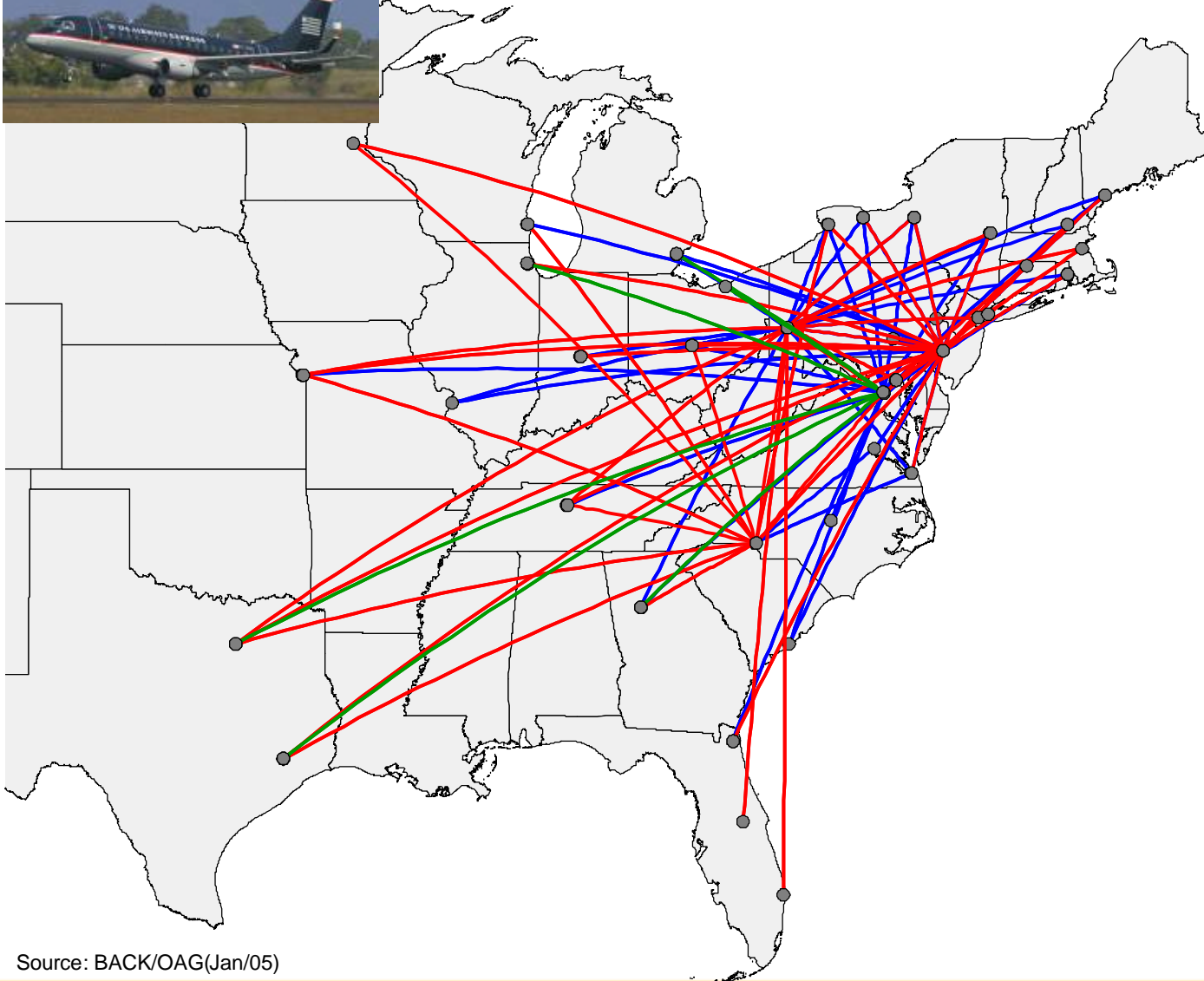
16 @ 34"

6 @ 36"

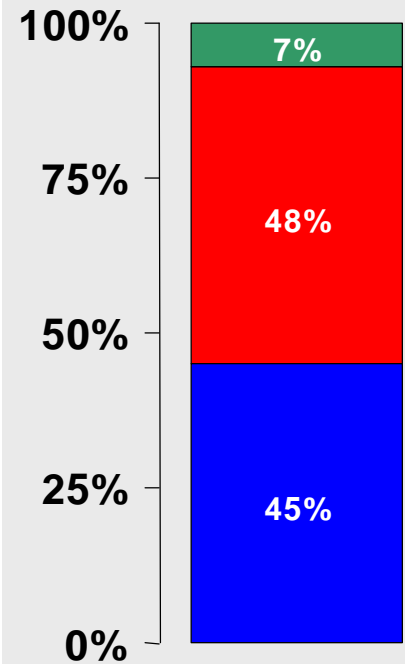




# EMBRAER 170 Network



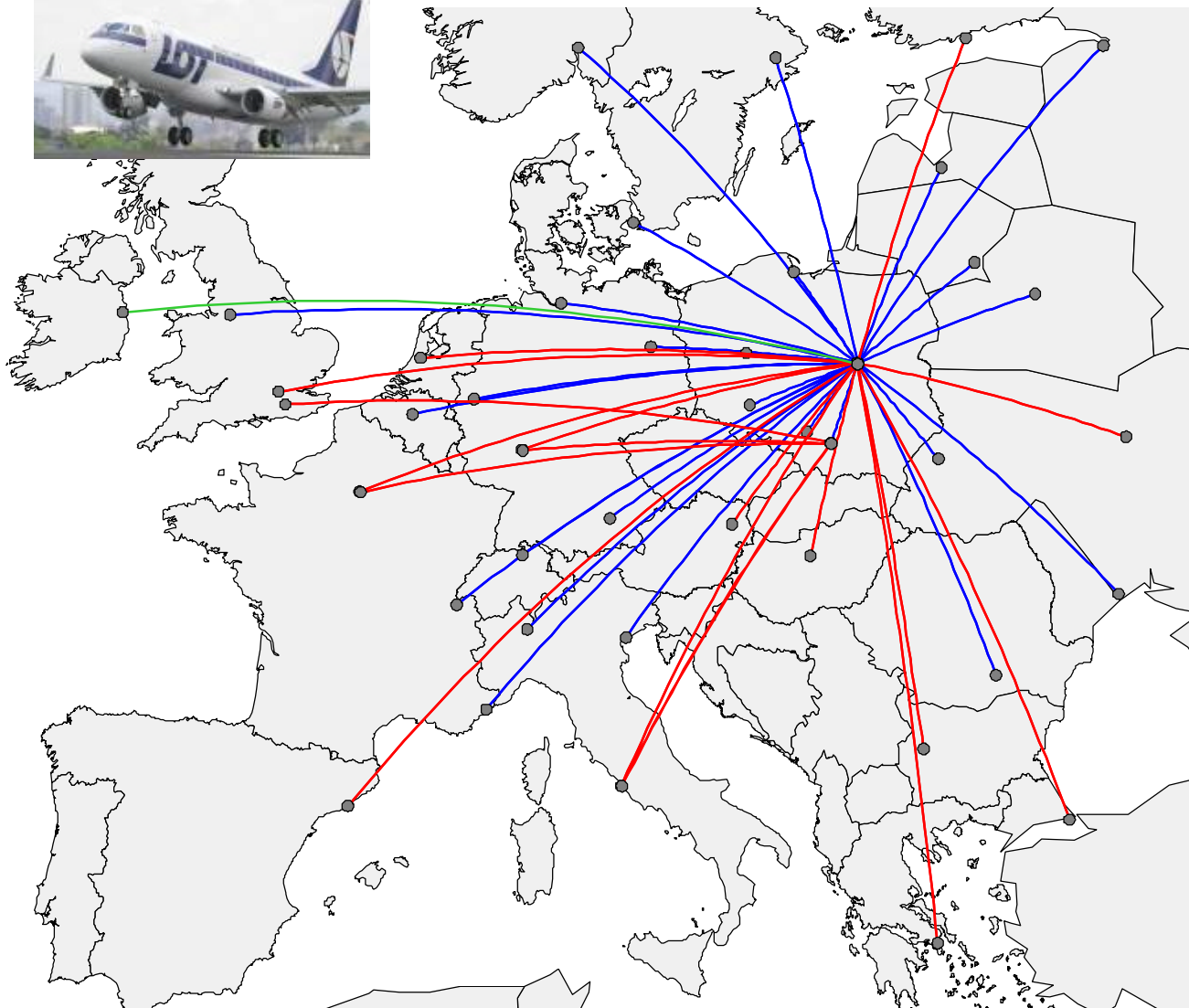
**New Route**  
**Right-sizing**  
**Natural Growth**



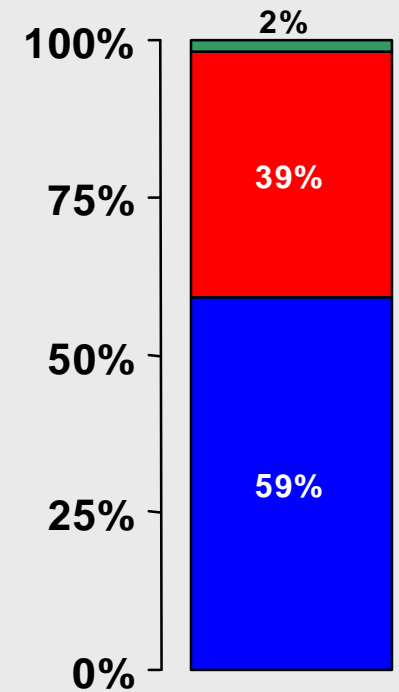
Source: BACK/OAG(Jan/05)



# EMBRAER 170 Network

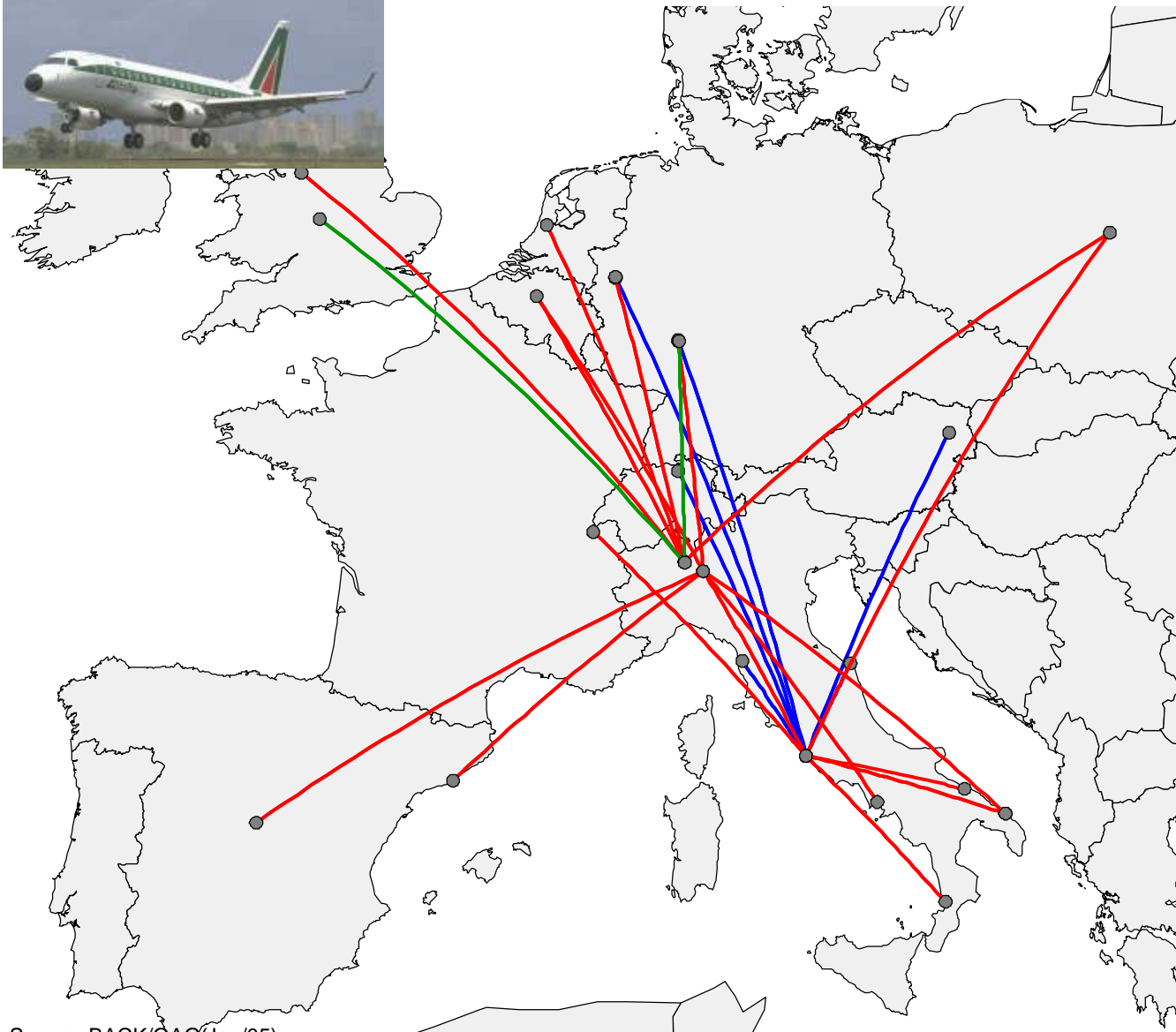


**New Route**  
**Right-sizing**  
**Natural Growth**



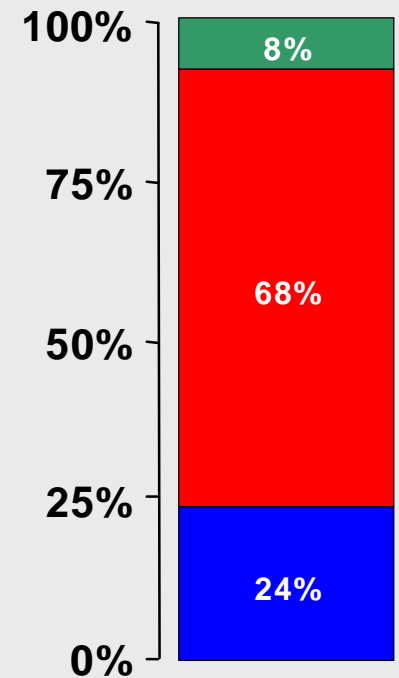
Source: BACK/OAG(Jan/05)

# EMBRAER 170 Network

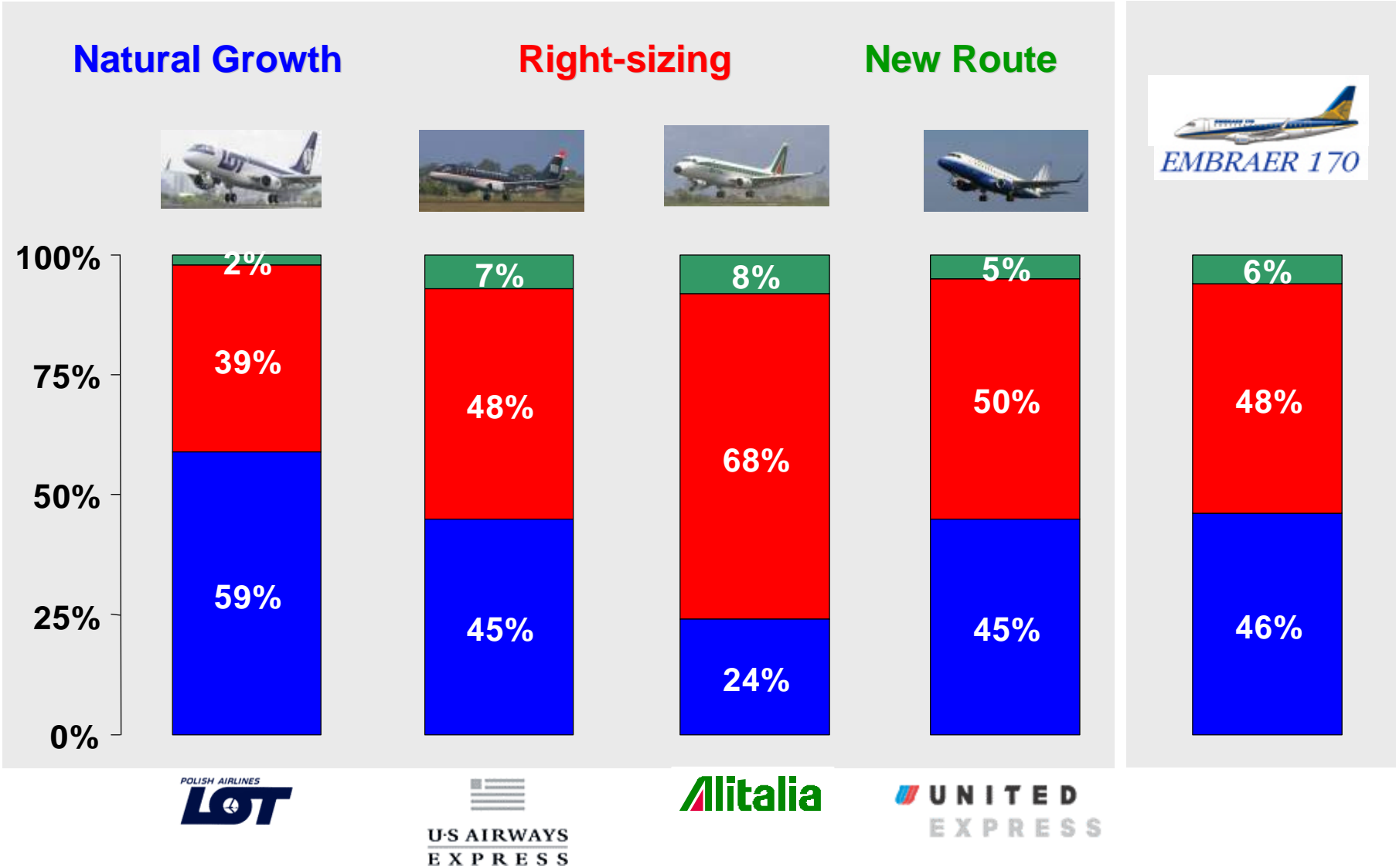


Source: BACK/OAG(Jan/05)

**New Route**  
**Right-sizing**  
**Natural Growth**



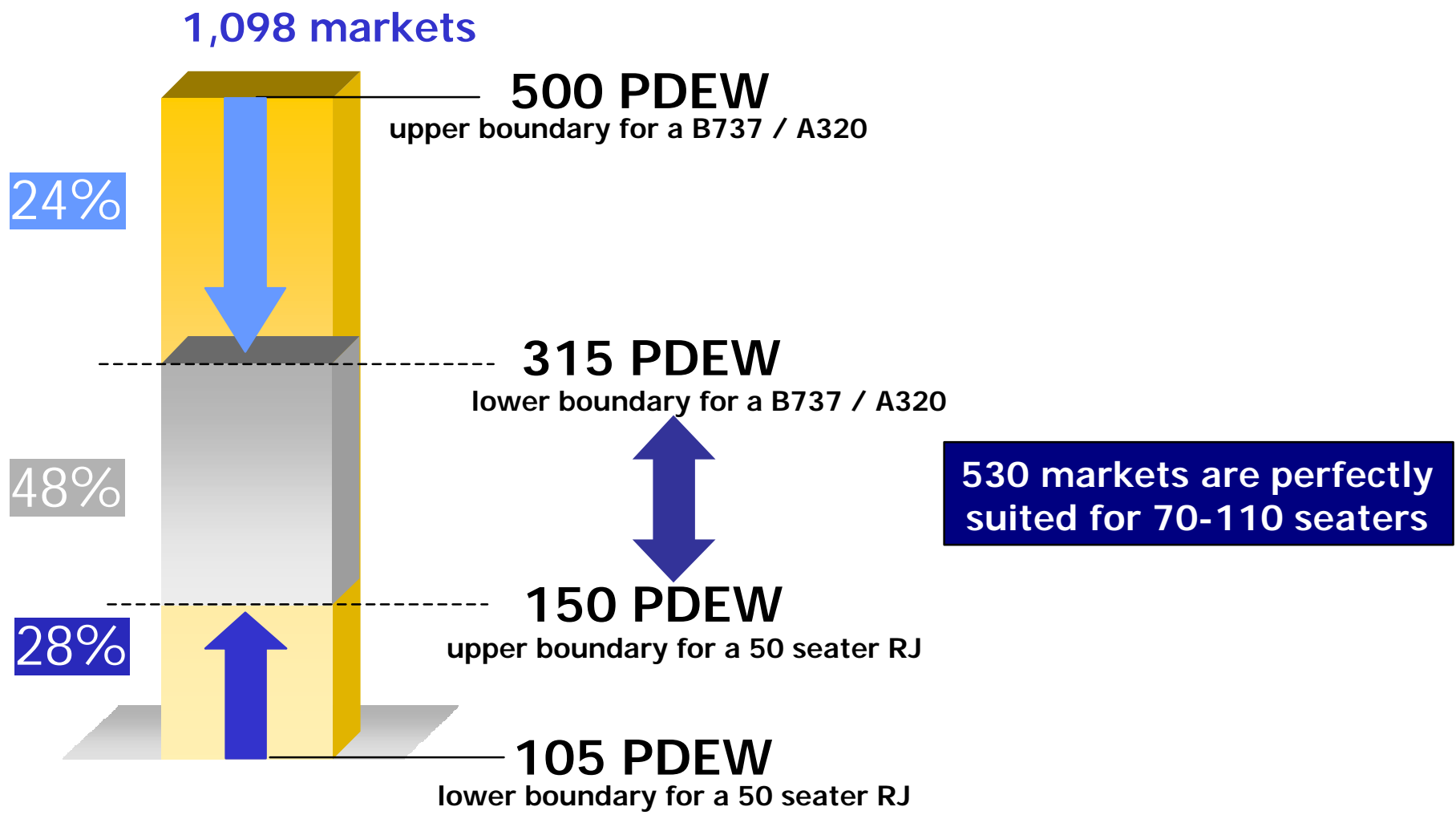
# EMBRAER 170 Main Missions



Source: BACK/OAG(Jan/05)

# LCC Next Step - Moving Downwards in Capacity

**EMBRAER**  
*Commercial Jets*



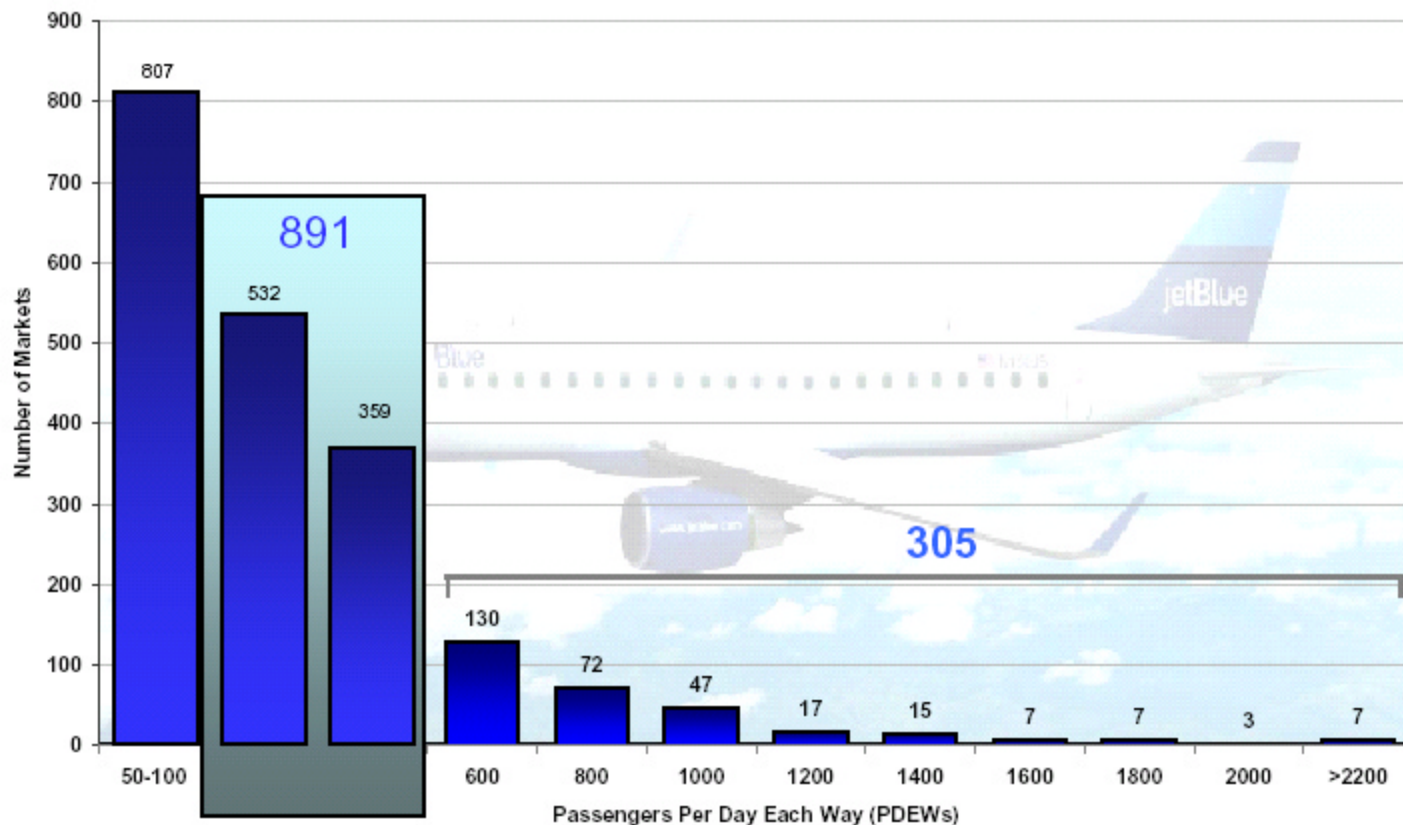
Source : US DOT OD1A



# Attractive Market Opportunities

*Mid-Sized Markets are the largest segment of the U.S. Domestic Market*

## U.S. Domestic Markets By Passenger Volume



# EMBRAER 190 – JetBlue



**"JetBlue will bring its superior product and award-winning customer service to many mid-sized markets desperately in need of low fares and high quality service.**

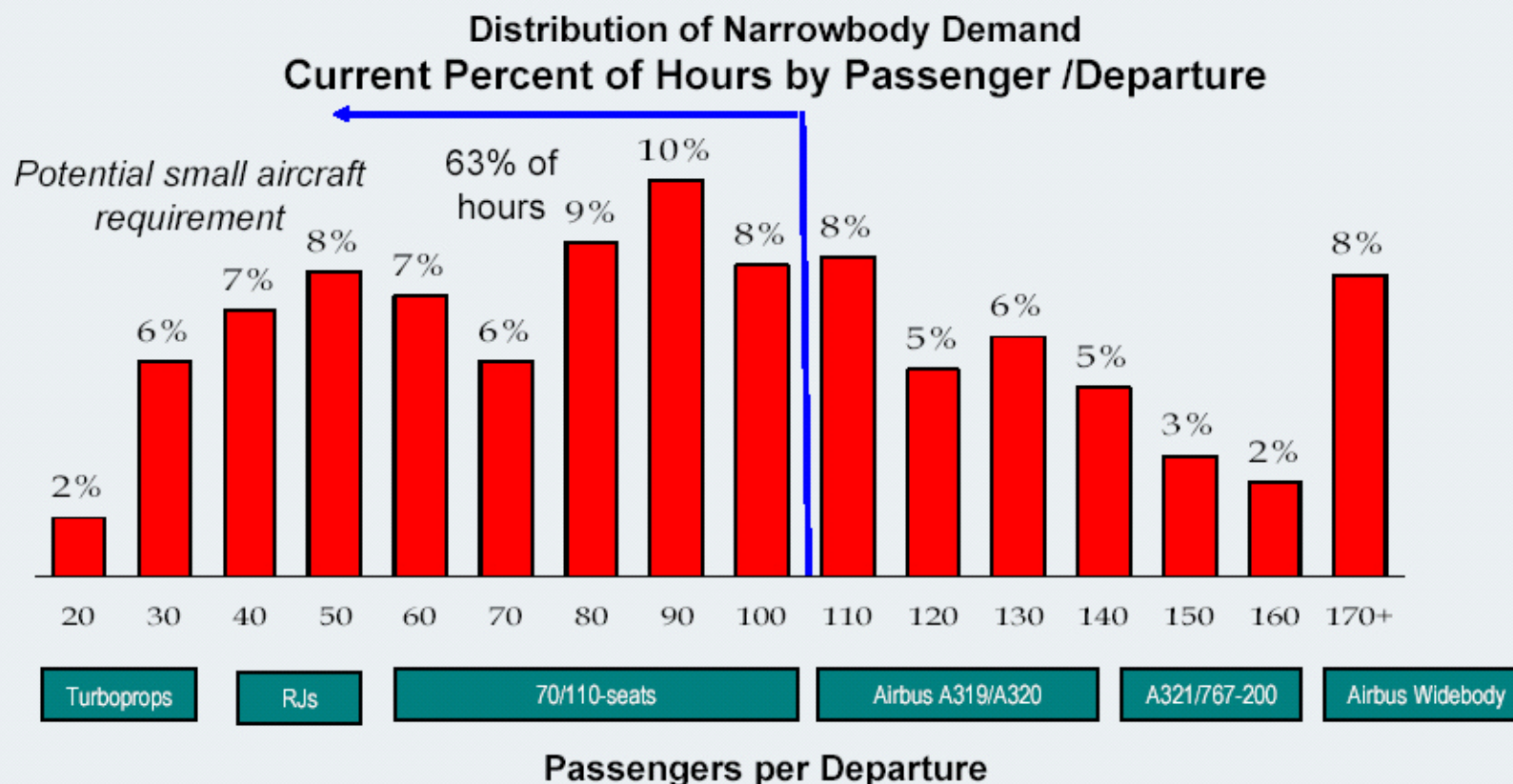
**With a combined Airbus and Embraer fleet, we will be well-positioned to offer a better product to markets of all sizes across the U.S., without compromising the low fares, cabin comfort and great service that are the hallmarks of the JetBlue experience."**

**David Neeleman, CEO of JetBlue Airways (Jun/2003)**



# Air Canada's Narrowbody Fleet Significantly Over-gauged; New Fleet Type Needed

- 63% of all block hours flown carry less than 100 passengers per departure while only 29% of the block hours are operated by aircraft with less than 120 seats



# EMBRAER 175 / 190 – Air Canada



“Together with the EMBRAER 190, the EMBRAER 175 will give Air Canada a competitive edge in offering high frequency, low-cost services on new and existing routes in Canada and the United States.”

Robert Milton, Air Canada President and CEO (Nov/2004)



# EMBRAER 170 / 190 Family Orderbook



	Firm	Options	Total	Deliveries	Firm Backlog
<b>EMBRAER 170</b>	<b>158</b>	<b>177</b>	<b>335</b>	<b>46</b>	<b>112</b>
<b>EMBRAER 175</b>	<b>15</b>	<b>-</b>	<b>15</b>	<b>-</b>	<b>15</b>
<b>EMBRAER 190</b>	<b>155</b>	<b>230</b>	<b>385</b>	<b>-</b>	<b>155</b>
<b>EMBRAER 195</b>	<b>15</b>	<b>20</b>	<b>35</b>	<b>-</b>	<b>15</b>
<b>Total</b>	<b>343</b>	<b>427</b>	<b>770</b>	<b>46</b>	<b>297</b>





# Embraer Market Forecast

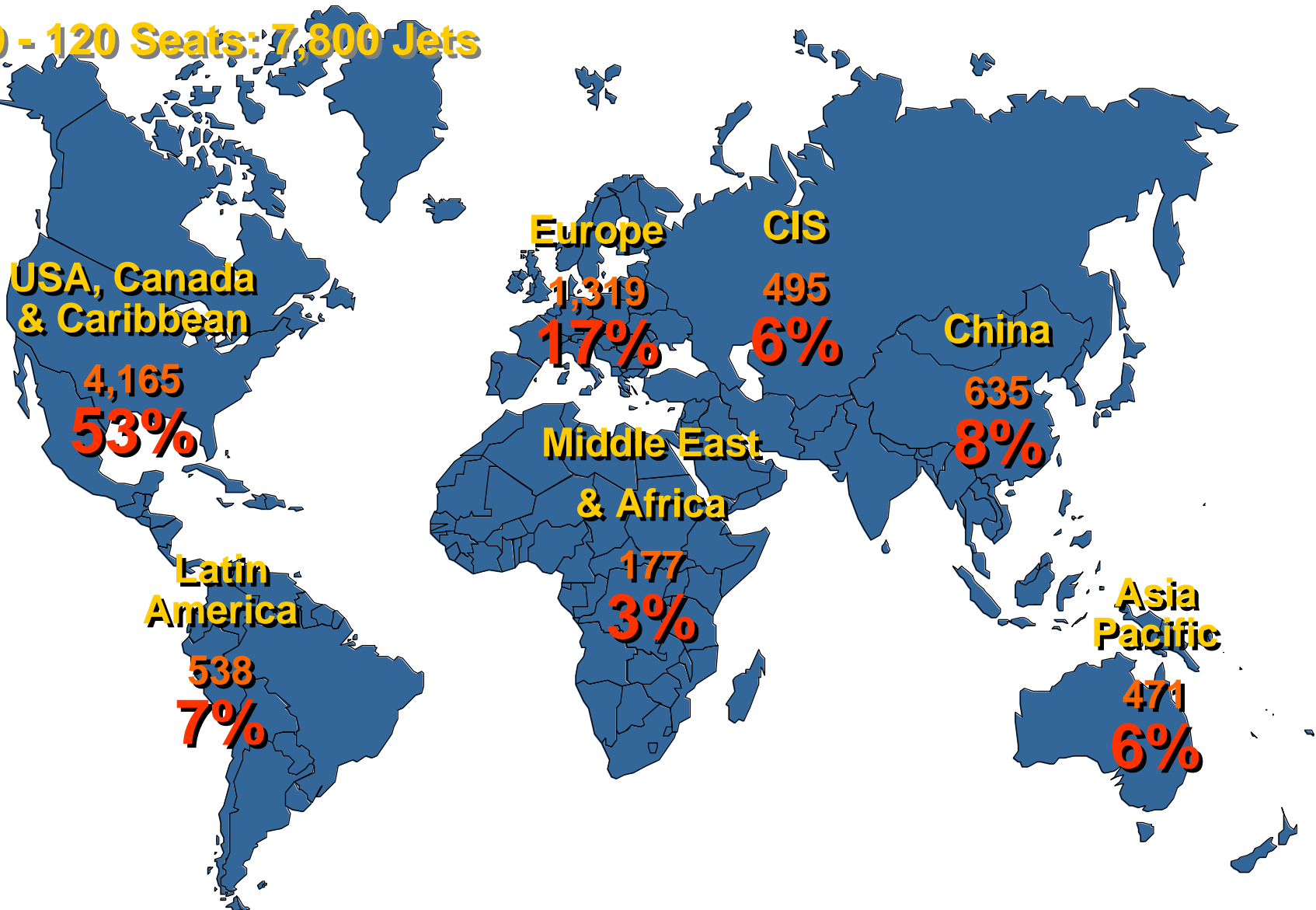
## Worldwide Jet Deliveries by Capacity Segment

Segment	2005 - 2014	2015 – 2024	2005 - 2024
30 - 60	650	1,300	1,950
61 – 90	1,300	1,550	2,850
91 – 120	1,250	1,750	3,000
TOTAL	3,200	4,600	7,800

**30 to 120-seat segment value = US\$ 170 billion**

# Embraer Market Forecast (2005-2024)

**30 - 120 Seats: 7,800 Jets**





# The **E**-Jets Family



# Thank you !